

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

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In re Application Serial No. 10/612,434

Applicants: Alan Wu et al

Group Art Unit: 3743

Filing Date: July 2, 2003

Title: BAFFLED SURFACE COOLED HEAT EXCHANGER

Attorney Docket No.: 60680-705

Dear Sir:

SUPPLEMENTAL INFORMATION DISCLOSURE STATEMENT UNDER 37 C.F.R. 1.97(C)

In connection with the U.S. patent application identified above, Applicant wishes to draw to the Examiner's attention the following art, but no representation is made that a comprehensive search has been made or that no better prior art exists.

Enclosed herewith is a List of References Cited By Applicant (PTO-1449) along with copies of each of the listed references which are not U.S. patents or published U.S. patent applications. Attached to the enclosed list is a brief English description indicating the relevance of those references which are not in the English language. It is requested that all of these references be considered, made of record in the prosecution history of this application, and appear among the references cited on any patent to issue from this application.

The Applicant petitions for consideration of this Information Disclosure Statement and authorizes the Assistant Commissioner to deduct the fee of \$180.00 required under 37 C.F.R. §1.97 (c)(2) and 37 C.F.R. §1.17 (p) from Deposit Account No. 13-2400. The Assistant Commissioner is authorized to deduct any additional fees required in connection with this Information Disclosure Statement from Deposit Account No. 13-2400 and to credit any overpayment to Deposit Account No. 13-2400.

EXECUTED at Mississauga, Ontario, Canada, this 31st day of August, 2005.

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Respectfully submitted,

By:

Peter R. Hammond
Peter R. Hammond
Registration No. 27,524

Encl.
RIDOUT & MAYBE LLP
1 City Centre Drive, Suite 308
Mississauga, Ontario,
Canada L5B 1M2
(905) 276-2300



| Form PTO-1449b, U.S. DEPARTMENT OF COMMERCE (Rev. 2-32) PATENT AND TRADEMARK OFFICE | | | | Attorney Docket No. 60680-705 | | Serial No. 10/612,434 | |
|--|--------------------|--------------------|-----------------------|----------------------------------|----------|---|--|
| SUPPLEMENTAL INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Use Several Sheets if Necessary) | | | | Applicants: Wu <i>et al</i> | | | |
| | | | | Filing Date July 2, 2003 | | Group Art Unit: 3743 | |
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| EXAMINER | | DATE CONSIDERED |
| <p>* Examiner: Initial citation considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.</p> | | |

EXPLANATION OF NON-ENGLISH REFERENCE

- CH 220,299 This patent shows a rectangular, generally flat heat exchanger which has a serpentine member that extends between outer sidewalls. Vents appear to be located at opposite ends of the heat exchanger.
- DE OS 2,201,559 This reference teaches a flat type heat exchanger with rectangular sides and a folded internal wall that forms multiple passageways. These passageways are closed at their opposite ends by end plates. There are inlet and outlet openings on one side of the heat exchanger.
- DE 33 28 229 This patent appears to teach a heat exchanger for heat exchange between two fluids passing through parallel, alternating flat tubular structures. The passageways extend through an elongate boxlike structure that forms the external walls.
- DE 202 07 168 This utility model describes a rectangular, generally flat heat exchanger made with a flat top plate, an inner plate 3, a lower cover and a covered folded fin plate 2. A series of flat, transverse flow passageways are formed between the top plate and the internal plate 3.
- FR 1,189,606 This patent shows a heat exchanger with a base plate and a shaped cover plate and a turbulizer arranged between these two plates. Inlet and outlet connections are attached to the cover plate.
- FR 1,534,246 This patent teaches a finned member that has a tubular core from which the fins extend radially. End sections of each main fin are bent at different angles. This finned member is mounted on a hollow shaft as shown in Figure 4.
- JP 61-66061 This patent teaches a heat exchanger with upper and lower plate sections through which fluid passageways extend. These plates are interconnected along one side edge. The bottom plate is formed with a series of parallel fins that extend downwardly.
- JP 7-280484 This patent illustrates a stacked plate heat exchanger that can be fitted with turbulizer members shown in Figure 15. On one side of a pair of plates forming a tubular member, there can be arranged a corrugated fin structure as shown in Figure 18.
- EP 0 805 328 This patent describes a heat exchanger that can be made from a series of side-by-side plates and frame members (see Figure 1).

- EP 0 807 756 This patent shows various plate and finned members for use with fuel lines for heat exchange.
- FR 2,748,800 A heat exchanger is shown having adjacent plates with angled slots therein that criss-cross to define flow channels therebetween.
- DE 297 15 ⁸²⁸~~878~~ This patent illustrates and describes a heat exchanger that is made from two shaped rectangular plates. The two plates when connected form a serpentine fluid passageway that extends back and forth from one end of the plate to the other.
- DE 297 22 841 This patent shows a heat exchanger with a pair of plates defining a serpentine tubular flow passage. A corrugated fin is attached to the pair of plates.
- EP 0 826,874 This patent shows a heat exchanger with fins on one side and a labyrinth of grooves on the opposite side. A flat plate is located adjacent the grooves to define flow passages between the two plates.
- DE 298 03 166 This patent appears to illustrate a finned heat exchanger with two or more circular passageways arranged side-by-side and spaced apart by interconnecting webs. There are a series of fins integrally formed on one side of the heat exchanger.
- EP 0 890 810 This patent shows a fuel cooler that has an extruded or continuously cast main body containing a plurality of longitudinal internal flow channels. This main body has open ends. Another member with cooling ribs or fins is attached to the main body. Finally, end pieces or closing elements are used to close off the open ends of the main body and make the fuel flow in series through the fluid channels in the main body. (An English translation of the reference is attached to the reference).
- FR 2 769 082 This patent describes a heat exchanger comprising a series of stacked plates which are mounted in a housing. A turbulizer structure is apparently arranged between the stacked plates.
- FR 2,772,838 The fuel system consists of a fuel tank, supplying fuel to the injectors, with a fuel reflow circuit to return the fuel to the tank. The excess fuel emerging from the injector, is passed through a heat exchanger, which uses the flow of incoming air to cool the fuel, which is then returned to the fuel tank, and the air is supplied to the engine inlet.
- EP 0 907 061 This patent describes a heat exchanger which has a low profile and which is made from two plates that are spaced apart a short

distance and that are arranged between two tubular tanks for fluid flow. Short parallel fins extend upwardly and downwardly from these plates (see Figure 7). (An English translation of the reference is attached to the reference).

FR 2,774,462 This patent shows a heat exchanger having a corrugated plate attached to a flat plate to define flow channels therebetween. (An English translation of the reference is attached to the reference).

FR 2,774,463 This patent also shows a fuel cooler having a serpentine tube attached to a plate. The plate has cut-outs, tabs and ramps formed in it for directing air flow. (An English translation of the reference is attached to the reference).

FR 2,774,635 This patent shows a fuel cooler consisting of a serpentine tube attached to a louvered plate. (An English translation of the reference is attached to the reference).

FR 2,778,973 This patent illustrates a low profile but curved heat exchanger wherein upper and lower plates are separated by a series of fluid flow passageways. The upper and lower plate sections have a series of short ribs formed externally thereon (see Figure 3). An end plate closes the end of the fluid passageways.

FR 2,785,377 This patent shows a fuel cooler consisting of a serpentine tubular member mounted in a housing having a base and a cover. (An English translation of the reference is attached to the reference).

JP 62009182 Please refer to the English translation of the Abstract attached to the reference.

CERTIFICATE OF MAILING BY "EXPRESS MAIL" (37 CFR 1.10)

Applicant(s): WU ET AL.

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Examiner

FLANIGAN

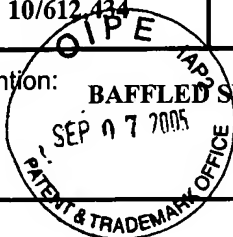
Customer No.

26127

Group Art Unit

3753

Invention: BAFFLED SURFACE COOLED HEAT EXCHANGER



I hereby certify that the following correspondence:

SUPPLEMENTAL INFORMATION DISCLOSURE STATEMENT, FORM PTO-1449, EXPLANATION OF NON-ENGLISH REFERENCES, and copies of 30 FOREIGN PATENT DOCUMENTS and 1 TECHNICAL PAPER*(Identify type of correspondence)*

is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 in an envelope addressed to: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on

09/07/2005*(Date)*MARY F. PELTIER*(Typed or Printed Name of Person Mailing Correspondence)**(Signature of Person Mailing Correspondence)*ED164797792US*("Express Mail" Mailing Label Number)***Note: Each paper must have its own certificate of mailing.**